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| 10/580,255 | 06/07/2006 | Ake Sjoberg | TPP 32006 | 1992 |
| 74217 7590 03/25/2011 NOVAK, DRUCE + QUIGG L.L.P. - PERGO 300 New Jersey Ave, NW Fifth Floor Washington, DC 20001 | | | | |
| EXAMINER | | | | |
| MUSSER, BARBARA J | | | | |
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Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary

Application No.

10/580,255

Applicant(s)

SJOBERG, AKE

Examiner

BARBARA J. MUSSER

Art Unit

1746

Period for Reply -- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 28 February 2011.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-16 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-16 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date _____
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date _____
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: _____

DETAILED ACTION

Continued Examination Under 37 CFR 1.114

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 2/28/11 has been entered.

Claim Rejections - 35 USC § 103

2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

3. Claims 1, 7-10, 15, and 16 are rejected under 35 U.S.C. 103(a) as being unpatentable over Drees et al. in view of Chen et al. '678.

Drees et al. discloses it is known to make a decorative laminate by applying a decorative sheet and a protective wear layer to a core material of particleboard or MDF, and then heating and bonding in a laminate press which bonds the layers together.([0004]-[0005]) Drees et al. does not disclose embossing a pattern into the particleboard core. Chen et al. '678 discloses it is known in the decorative laminate arts to use a core with an embossed surface.([0002];[0022]) It would have been

obvious to one of ordinary skill in the art at the time the invention was made to emboss the core of Drees et al. since Chen et al. '678 shows this is a known feature in decorative laminates which would allow the pattern to be in register with the printed design layer.[0020]

Regarding claims 7 and 8, Drees et al. discloses the decorative and protective layers can be impregnated with melamine formaldehyde resin.[0008] Both layers are made of cellulose.[0006]

Regarding claims 9 and 10, Chen et al. '678 discloses that aluminum oxide particles with a particle size of 20-200 nanometers can be present in the wear layer.[0031] It would have been obvious to one of ordinary skill in the art at the time the invention was made to use the particles of Chen et al. '678 in the wear layer of Drees et al. to provide improved resistance to wear.[0031]

4. Claim 2 is rejected under 35 U.S.C. 103(a) as being unpatentable over Drees et al. and Chen et al. '678 as applied to claim 1 above, and further in view of O'Brien et al.(U.S. Patent 6,551,678).

The references cited above do not disclose how the embossing of the core occurs. O'Brien et al. shows it is known to machine a pattern into a substrate.(Col. 10, ll. 20-25) It would have been obvious to one of ordinary skill in the art at the time the invention was made to machine the pattern into the core of Drees et al. and Chen et al. '678 since O'Brien et al .shows this is a known method of applying a pattern to a substrate.(Col. 10, ll. 20-25)

5. Claims 3-6 are rejected under 35 U.S.C. 103(a) as being unpatentable over Drees et al. and Chen et al. '678 as applied to claim 1 above, and further in view of Duvall.(U.S. Patent 2,803,188).

The references cited above do not disclose how the embossed pattern is applied to the core. Duvall discloses it is known to apply a pattern to a fiberboard core by spraying the core with water and then embossing it between a patterned roller and a counter roller.(Figure; Col. 3, ll. 35-50) It would have been obvious to one of ordinary skill in the art at the time the invention was made to emboss the fiberboard core of Drees et al. and Chen et al. '678 by spraying the core with water and then embossing it between a patterned roller and a counter roller(Figure; Col. 3, ll. 35-50) since this cause the surface of the board to yield readily to the embossing pressure. Water is considered a solvent.

6. Claims 11, 13, and 14 are rejected under 35 U.S.C. 103(a) as being unpatentable over Drees et al. and Chen et al. '678 as applied to claim 1 above, and further in view of Cannady, Jr. et al.(U.S. Patent 3,948,713).

The references cited above do not disclose the specifics of the bonding of the layers together in the press. Cannady, Jr. et al. discloses a method of making multiple decorative laminates where a pattern is applied to the surface of the wear layer using a metal foil which is cushioned from the surface of the press via a support layer(11). It would have been obvious to one of ordinary skill in the art at the time the invention was made to use a metal foil with a cushion to apply a pattern to the surface of the decorative laminate since this is a well-known method of applying texture to the surface

of a laminate as shown for example by Cannady, Jr. et al.(Figure; Col. 2, ll. 36-Col. 3, ll. 41)

Regarding claim 13, since the metal foil can be only 0.0003 inches thick, any pattern on it would be considered a micro structure.(Col. 3, ll. 40-41)

7. Claims 1, 2, 7, 8, 12, 15, and 16 are rejected under 35 U.S.C. 103(a) as being unpatentable over Drees et al. in view of Rauch(U.S. Patent 3,492,194)

Drees et al. discloses it is known to make a decorative laminate by applying a decorative sheet and a protective wear layer to a core material of particleboard or MDF, and then heating and bonding in a laminate press which bonds the layers together.([0004]-[0005]) Drees et al. does not disclose embossing a pattern into the particleboard core. Rauch discloses it is known when forming panels to emboss a wood surface and cover it with a colored plastic film which can have a variety of embossed designs.(Col. 1, ll. 25-43) It would have been obvious to one of ordinary skill in the art at the time the invention was made to emboss the core of Drees et al. since Rauch shows this is a known feature in wood panels and since the embossed pattern would enhance its aesthetic value.(Col. 1, ll. 38-42)

Regarding claim 2, Rauch discloses machining the pattern into the wood.(Col. 2, ll. 17)

Regarding claims 7 and 8, Drees et al. discloses the decorative and protective layers can be impregnated with melamine formaldehyde resin.[0008] Both layers are made of cellulose.[0006]

Regarding claim 12, Rauch discloses using a press roller or other means which have the pattern of the embossments in the core to press the layers into the embossments. It would have been obvious to one of ordinary skill in the art at the time the invention was made to use a press plate rather than a press roll with the patterned embossments to insure the pattern on the pressing surface was aligned with the pattern on the wood core particularly since Rauch discloses it was known in the prior art to use a press plate or roll to press the film onto the wood core indicating these are known alternatives in the art.(Col. 1, ll. 70-71)

8. Claims 9 and 10 are rejected under 35 U.S.C. 103(a) as being unpatentable over Drees et al. and Rauch as applied to claim 8 above, and further in view of Chen et al. '678.

The references cited above do not disclose having particles in the wear layer. Chen et al. '678 discloses that aluminum oxide particles with a particle size of 20-200 nanometers can be present in the wear layer.[0031] It would have been obvious to one of ordinary skill in the art at the time the invention was made to use the particles of Chen et al. '678 in the wear layer of Drees et al. and Rauch to provide improved resistance to wear.[0031]

9. Claims 11, 13, and 14 are rejected under 35 U.S.C. 103(a) as being unpatentable over Drees et al. and Rauch as applied to claim 1 above, and further in view of Cannady, Jr. et al.(U.S. Patent 3,948,713).

The references cited above do not disclose the specifics of the bonding of the layers together in the press. Cannady, Jr. et al. discloses a method of making multiple

decorative laminates where a pattern is applied to the surface of the wear layer using a metal foil which is cushioned from the surface of the press via a support layer(11). It would have been obvious to one of ordinary skill in the art at the time the invention was made to use a metal foil with a cushion to apply a pattern to the surface of the decorative laminate since this is a well-known method of applying texture to the surface of a laminate as shown for example by Cannady, Jr. et al.(Figure; Col. 2, ll. 36-Col. 3, ll. 41)

Regarding claim 13, since the metal foil can be only 0.0003 inches thick, any pattern on it would be considered a micro structure.(Col. 3, ll. 40-41)

Response to Arguments

10. Applicant's arguments filed 2/28/11 have been fully considered but they are not persuasive.

Regarding applicant's argument that the surface of Drees et al. is smooth, both Chen et al. '678 and Rauch show it is known to emboss a wood core and cover it with a plastic film.

Regarding applicant's argument that the decorative layer of Chen et al. '678 is not a sheet, the decorative layer of Drees et al. is. Additionally, the plastic film of Rauch, which can be colored, is a film which is pressed into an embossed substrate. Chen is used to show it is known to emboss a pattern on the core which creates a 3D pattern which would be aligned with a printed pattern to form a three dimensional pattern. Chen is forming the same type of article as Drees et al., namely a decorative

laminate, and one in the art would appreciate that the patterning of the core of Chen could be used for the same reason in Drees et al.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to BARBARA J. MUSSER whose telephone number is (571)272-1222. The examiner can normally be reached on Monday-Thursday; alternate Fridays.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Katarzyna Wyrozebski can be reached on (571)-272-1127. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/John L. Goff/

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Primary Examiner, Art Unit 1746

BJM
/B. J. M./
Examiner, Art Unit 1746